

GEO | construct



Project	Barron River Embankment, Mareeba, Qld
Technology	Launched Soil Nails (Shotrods) and GCS Wall
Client	Queensland Department of Transport and Main Roads
Completed	2009

The Barron River Embankment, located along the busy Kennedy Highway, just outside Mareeba was suffering from the development of shallow circular type failure on the road shoulder expressed by cracking and vertical displacement damage to the pavement and concrete curbing. Severe erosion along the crest of the batter was also present and an immediate solution was required to prevent severe damage and closure of the highway.

The Department of Transport and Main Roads engaged Probin Drilling & Construction, now known as Geo Construct, together with design partner McIlveen Ford Consultants, now named Geo Design, to utilise Launched Soil and Geosynthetically Confined Soil® (GCS) Wall technology for the Barron River Embankment project, the first of its kind in Australia. PD&C installed approximately 800 Launched Soil Nails (Shotrods) into the embankment at a rate of one SuperNail® about every four minutes. Together with Shotrods technology PD&C constructed a GCS® Wall which widened the embankment facilitating the provision of a bike/pedestrian path.

With minimal disruption to the travelling public, the project was completed in approximately four weeks; a significant reduction in the construction time and cost over any other option being considered.

Drawing: Barron River Embankment Design Model

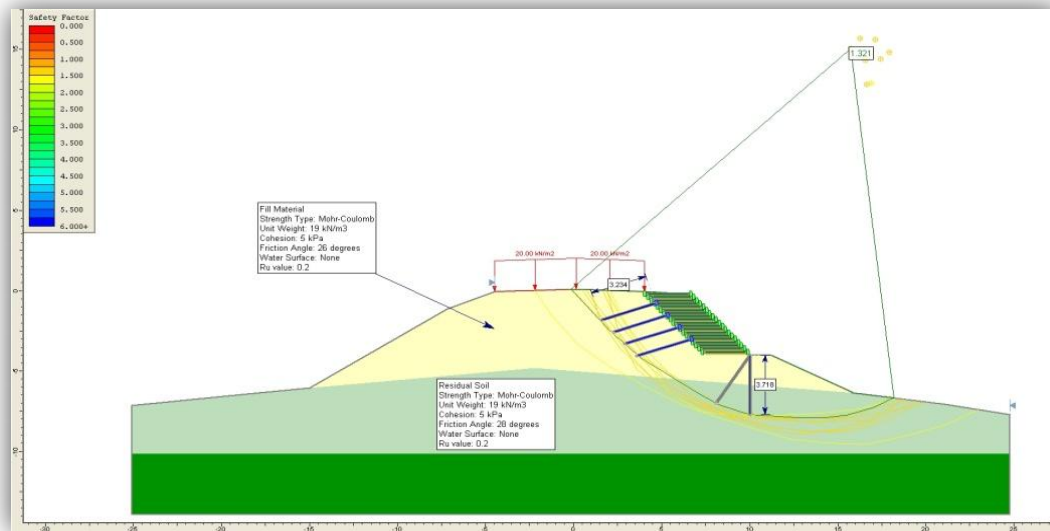


Photo: Launched Soil Nails (Shotrods) being installed in the Barron River Embankment



Photo: Completed GCS Wall with the first signs of vegetation

